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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/070,969	08/07/2002	Martin Brundert	4925-216PUS	4759

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COHEN, PONTANI, LIEBERMAN & PAVANE
551 FIFTH AVENUE
SUITE 1210
NEW YORK, NY 10176

EXAMINER	
WANG, U LUN	

ART UNIT	PAPER NUMBER
2632	

DATE MAILED: 09/13/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary	Application No.	Applicant(s)	
	10/070,969	BRUNDERT ET AL.	
	Examiner	Art Unit	
	U-Lun Wang	2632	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

1)☒ Responsive to communication(s) filed on *13 March 2002*.

2a)☐ This action is **FINAL**. 2b)☒ This action is non-final.

3)☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

4)☒ Claim(s) *1-10* is/are pending in the application.

4a) Of the above claim(s) _____ is/are withdrawn from consideration.

5)☐ Claim(s) _____ is/are allowed.

6)☒ Claim(s) *1-10* is/are rejected.

7)☐ Claim(s) _____ is/are objected to.

8)☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

9)☐ The specification is objected to by the Examiner.

10)☒ The drawing(s) filed on *13 March 2002* is/are: a)☒ accepted or b)☐ objected to by the Examiner.

Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).

Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).

11)☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

12)☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

a)☒ All b)☐ Some * c)☐ None of:

1.☐ Certified copies of the priority documents have been received.

2.☐ Certified copies of the priority documents have been received in Application No. _____.

3.☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

1) ☒ Notice of References Cited (PTO-892)
2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
3) ☒ Information Disclosure Statement(s) (PTO/SB/08) Paper No(s)/Mail Date *3/13/02,12/16/02*.
4) ☐ Interview Summary (PTO-413) Paper No(s)/Mail Date. _____ .
5) ☐ Notice of Informal Patent Application
6) ☐ Other: _____.

DETAILED ACTION

Information Disclosure Statement

1. All documents in the information disclosure statements are considered.

Claim Objections

2. Claims 3 and 8 objected to because of the following informalities:

The phrase "each of the channels of the sectors have" in claim 3 and 8 should read as "each of the channels of the sectors has". Appropriate correction is required.

Claim Rejections - 35 USC § 103

3. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

> (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

4. Claims 1 - 10 are rejected under 35 U.S.C. 103(a) as being unpatentable over Wakizaka (U.S. Patent 6,639,916 B1) in view of Negishi et al. (U.S. Patent 6,414,970 B1) hereafter referred as Negishi.

For claim 1, Wakizaka discloses a telecommunication network (See Fig. 8) using the W-CDMA (See Wakizaka claim 7) protocol comprising a variety of base stations (BS) (Fig. 8 item 38 is a radio base station) communicating with each other via a central Radio Network Controller (RNC) (Fig. 8, item 1 exchange is a radio network controller in a CDMA network) by an ATM based data connection via an I_{ub} interface, thereby at

least one of the base stations (BS) is comprising a variety of radio sectors (1, 2, 3,...n) with physically distributed AAL-2 based termination points (TP) (Fig. 8, radio unit 23 from 1 to n), each termination point having a AAL-2 over ATM structure where different call ID's are mapped into respective ATM virtual connections (ATM/VC) under the control of a control unit timer (CU-timer) having a determined delay time, all AAL cell streams being sent parallel to each other to an ATM switching unit (AXU) via an UTOPIA interface, characterized in, that the ATM switching unit comprises a multiplexing unit (AAM CPS MUX) (Fig 8, item 6 is the multiplexer) for multiplexing AAL-2 connections of the different termination points (TP) into one single ATM virtual connection to be processed by the ATM switch.

Wakizaka does not particularly disclose a control unit timer that is common in any multiplexer.

Negishi teaches using a system clock/timer to control each data stream (Fig. 9).

It would have been obvious to one of ordinary skill in the art at the time the invention was made to use Negishi's teaching to use a timer in the network of Wakizaka.

The motivation is to control the input/output rate of the data stream involved to achieve the most efficient use of the bandwidth and synchronization of the data streams.

Claim 2: Telecommunication network according to claim 1, characterized in, that both the AAL-2 stream coming from the individual radio sectors and the multiplexed AAL-2 stream have independent CU-timers.

For claim 2, Wakizaka as modified by Negishi teaches the limitation of claim 1 which claim 2 depends.

Negishi does teach independent system clocks/timers for each of the input degree one stream (i.e. System Clock C_{p1} in Fig. 9) and for the degree two multiplexer (System Clock C_r in Fig. 9).

Claim 3: Telecommunication network according to claim 1, characterized in that each of the channels of the sectors has different bandwidths.

For claim 3, Wakizaka as modified by Negishi teaches the limitation of claim 1 which claim 3 depends.

W-CDMA networks inherently support different bandwidths such as 13k and 48k bps.

Claim 4: Telecommunication network according to claim 1, characterized in, that the multiplexing unit (AAM CPS MUX) has a switchable bypass line.

Claim 5: Telecommunication network according to claim 4, characterized in, that the multiplexing unit (AAM CPS MUX) is of plug-in type.

Claim 9: Telecommunication network according to claim 2, characterized in, that the multiplexing unit (AAM CPS MUX) has a switchable bypass line.

Claim 10: Telecommunication network according to claim 3, characterized in, that the multiplexing unit (AAM CPS MUX) has a switchable bypass line.

For claim 4, 5, 9 and 10, the additional features of "the multiplexing unit (AAM CPS MUX) has a switchable bypass line" and "the multiplexing unit (AAM CPS MUX) is of plug-in type" are design details within the capability of one skilled in the art to implement. The claims are rejected. The written opinion of PCT/EP99/07210 also maintains the same point of view.

Claim 6: ATM switch for a telecommunication network using the W_CDMA protocol comprising a variety of base stations (BS) communicating with each other via a central Radio Network Controller (RNC) by an ATM based data connection via an I_{ub} interface whereby at least one of the base stations (BC) is comprising a variety of radio sectors (1, 2, 3,...n) with physically distributed AAL-2 based termination points, each termination point having a AAL-2 over ATM structure where different call ID's are mapped into ATM virtual connections (ATM/VC) under the control of a control unit timer (CU-timer) having a determined delay time, all AAL cell streams being sent parallel to each other to an ATM switching unit (AXU) via an UTOPIA interface, characterized in, that the ATM switching unit comprises a multiplexing AAL-2 connections of the different

termination points TP into one single ATM virtual connection to be processed by the ATM switch.

For claim 6, it is similar to "telecommunication network" claim 1 except that it claims the ATM switch.

Wakizaka does disclose an ATM switch (Fig. 8, item 10, the ATM transmission line is connected to an ATM switch.

Claim 7: Method for data processing in a telecommunication network using the W-CDMA protocol, the network consisting of a variety of basis stations communication with a central radio network controller via an I_{ub} interface in which the data connection between the base stations and the RNC controller uses ATM based broadband data traffic, whereby at least one of the base stations generates AAL over ATM data streams corresponding to the termination points of different radio sectors within one cell (base station), the different call ID's within the same sector being mapped into AAL-2 over ATM streams with a given delay time under control of a control unit timer, and whereby all ATM cell streams of the different sectors of one base unit are sent in parallel to an ATM switching unit via an UTOPIA interface, characterized in, that parallel incoming AAL-2 connections of the different termination points of one base station are multiplexed into one single ATM cell virtual connection before being processed by the ATM switch.

For claim 7, it is similar to "telecommunication network" claim 1 except that it is a method claim.

Wakizaka does disclose the method (Fig. 8).

Claim 8: Telecommunication network according to claim 2, characterized in that each of the channels of the sectors has different bandwidths.

For claim 8, Wakizaka as modified by Negishi teaches the limitation of claim 2 which claim 8 depends.

W-CDMA networks inherently support different bandwidths such as 13k and 48k bps.

Conclusion

Any inquiry concerning this communication or earlier communications from the examiner should be directed to U-Lun Wang whose telephone number is (571) 270-1140. The examiner can normally be reached on Monday - Friday, 7:30 AM - 5 PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Frantz F. Jules can be reached on 571-272-6681. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

UW/

September 5, 2006

Frantz F. Jules
Supervisory
Patent Examiner